## ABSTRACT

## ACOUSTIC LINER FOR GAS TURBINE ENGINE

- 5 A passive acoustic liner system (50) for attenuating a sound field comprising, in acoustic series, a mode-scattering segment (48) and a sound-absorbing segment (40), wherein the mode scattering segment (48) provides a reactance between -12 and -2  $\rho c$  and the sound absorbing segment (40) provides a reactance between -1 and 0  $\rho c$  thereby providing a reactance discontinuity such that mode-scattering of the sound field enables the sound-absorbing segment (48) to further absorb the scattered sound.
- 15 (Figure 1)